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10/519,422	12/23/2004	Toshiya Hamada	275872US6PCT	6910
22850	7590	04/07/2008	EXAMINER	
OBLON, SPIVAK, MCCLELLAND MAIER & NEUSTADT, P.C. 1940 DUKE STREET ALEXANDRIA, VA 22314			HARVEY, DAVID E	
ART UNIT	PAPER NUMBER			
	2621			
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patentdocket@oblon.com
oblonpat@oblon.com
jgardner@oblon.com

Office Action Summary	Application No. 10/519,422	Applicant(s) HAMADA ET AL.
	Examiner DAVID E. HARVEY	Art Unit 2621

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
 - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
 - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED. (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 16 May 2007.
 2a) This action is FINAL. 2b) This action is non-final.
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-17 and 38 is/are pending in the application.
 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
 5) Claim(s) _____ is/are allowed.
 6) Claim(s) 1-3,8-17 and 38 is/are rejected.
 7) Claim(s) 4-7 is/are objected to.
 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
 10) The drawing(s) filed on 23 December 2004 is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) Notice of References Cited (PTO-892)
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
 3) Information Disclosure Statement(s) (PTO/SB/08)
 Paper No(s)/Mail Date 4/10/2006, 1/3/2006, 12/23/2004
- 4) Interview Summary (PTO-413)
 Paper No(s)/Mail Date _____
 5) Notice of Informal Patent Application
 6) Other: _____

1. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

2. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

3. Claims 9 and 11-17 rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

A) It is noted that the preamble of claim 9 indicates that it is the "reproducing program" (i.e., computer software) that is being claimed. Computer software, per se, constitutes non-statutory subject matter.

B) It is noted that the "storage medium" recitation in the preamble of claim 11 suggests that the claim might be directed to an article of manufacture. Turning to the body of the claim, however, it is clear that the claim simply defines the content of the data being stored on the medium and, therefor, constitutes an "abstract idea"; i.e., wherein "abstract ideas" represent a Section 101 judicial exception. Here it is noted that the recited abstract idea, i.e., the recited data content, does not produce a useful, concrete, and tangible result. As such, the abstract idea set forth in claim 11, i.e., the recited data content, constitutes non-statutory subject matter. Similar clarification is needed with respect to claims 12-17 that depend therefrom.

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102
that form the basis for the rejections under this section made in this Office
action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. Claim1 is rejected under 35 U.S.C. 102(b) as being anticipated by US Patent #6,430,361 to Lee.

A) The examiner notes that, with respect to the instant rejection, claim 1 has been broadly construed as *not* requiring the recited "flag" to be data that is separate and distinct from the number of angles.

B) As is shown in figure 7, Lee discloses a reproducing apparatus for reproducing content data recorded on a recording medium wherein the apparatus comprises:

1) **Reading means** (e.g., @ 42, 44, 46, 48, 54, 58) for reading content data from the recording medium [note lines 28-32 of column 3] wherein, as shown in figure 9, the content data comprises system information [note lines 13-17 of column 4] that includes:

a) "NO. OF ANGLES" data which, as described, serves as a *flag* for representing whether the associated content data reproduction unit can be reproduced with a plurality of angles [Note: lines 61-63 of column 4; and block 101 of Figure 10];

b) "NO. OF ANGLES" data which serves to identify the number of angles that the associated content data reproduction unit can reproduce; and

c) "Start Add. OF VIDEO BLOCK" data which identifies the start of each of the video blocks and thus represent the position of the respective angles; and

2) **Reproducing means** (e.g., @ 62, 64) for controlling the reading means so that the video stream that composes the angles is read according to the position signals.

6. **Claims 2 and 3 are rejected under 35 U.S.C. 102(b) as being anticipated by US Patent #6,430,361 to Lee for the same reasons that were explained for claim 1 above. Additionally:**

A) With respect to claim 2:

The reproducing means (@ 62) is configured to change the reproduction position of the stream (via switch 54) in accordance with the position so as to allow the current angle to be switched when the flag indicates that there are a plurality of angles [See figure 10].

B) With respect to claim 3:

It is noted that, as shown in figure 6, the video data stream has been encoded/compressed and formatted into encode units (see figure 9) which necessarily represent one or more video frames. As shown in figure 9, each encode unit is preceded by system information relating thereto. As noted above, the system information of each unit includes respective "NO. OF ANGLES" data acting as a *flag* for that encode unit. Thus, the process shown in figure 10 is performed at the beginning of each encode unit (i.e., the first, second, third, etc....)

7. **Claim 8 is rejected under 35 U.S.C. 102(b) as being anticipated by US Patent #6,430,361 to Lee.**

A) The examiner notes that, with respect to the instant rejection, claim 1 has been broadly construed as *not* requiring the recited "flag" to be data that is separate and distinct from the number of angles.

B) As is shown in figure 7, Lee discloses a reproducing apparatus for reproducing content data recorded on a recording medium wherein the apparatus comprises:

1) Reading means (e.g., @ 42, 44, 46, 48, 54, 58) **for reading** content data from the recording medium [note lines 28-32 of column 3] wherein, as shown in figure 9, the content data comprises system information [note lines 13-17 of column 4] that includes:

- a) "NO. OF ANGLES" data which, as described, serves and a **flag** for representing whether the associated content data reproduction unit can be reproduced with a plurality of angles [Note: lines 61-63 of column 4; and block 101 of Figure 10);
- b) "NO. OF ANGLES" data which serves to identify the number of angles that the associated content data reproduction unit can reproduce; and
- c) "Start Add. OF VIDEO BLOCK" data which identifies the start of each of the video blocks and thus represent the position of the respective angles; and

2) Reproducing means (e.g., @ 62, 64) **for controlling** the reading means so that the video stream that composes the angles is read according to the position signals.

8. **Claim 11 is rejected under 35 U.S.C. 102(b) as being anticipated by US Patent #6,430,361 to Lee for the same reasons that were explained for claim 1 above.**

9. **Claims 12 and 13 are rejected under 35 U.S.C. 102(b) as being anticipated by US Patent #6,430,361 to Lee for the same reasons that were explained for claim 11 above. Additionally:**

A) With respect to claim 12:

The reproducing means (@ 62) is configured to change the reproduction position of the stream (via switch 54) in accordance with the position so as to allow the current angle to be switched when the flag indicates that there are a plurality of angles [See figure 10].

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B) With respect to claim 13:

It is noted that, as shown in figure 6, the video data stream has been encoded/compressed and formatted into encode units (see figure 9) which necessarily represent one or more video frames. As shown in figure 9, each encode unit is preceded by system information relating thereto. As noted above, the system information of each unit includes respective "NO. OF ANGLES" data acting as a *flag* for that encode unit. Thus, the process shown in figure 10 is performed at the beginning of each encode unit (i.e., the first, second, third, etc,...)

10. Claim 38 is rejected under 35 U.S.C. 102(b) as being anticipated by US Patent #6,430,361 to Lee for the same reasons that were explained for claim 1 above. Additionally:

It is noted that, as shown in figure 9, the video stream is recorded in the form of respective reproduction units.

11. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

12. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #6,430,361 to Lee.

Lee discloses a method as was set forth above with respect to claim 8.

Claim 9 differs from the showing of Lee only in that claim 9 recites that the method is performed by a software driven computer device.

The examiner takes Official Notice that it was notoriously well known in the art to have implemented signal reproduction circuitry, of the type described by Lee, using a software driven computer. Such configurations were known to have been advantageous in that they did not require the use/cost of dedicated circuitry and that they permitted upgrades to be made simply by updating the software.

The examiner maintains that it would have been obvious to have implemented the system shown in Figure 7 of Lee using a software driven computer, as opposed to dedicated circuitry, to obtain the benefit associated therewith.

13. Claim 10 is rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #6,430,361 to Lee.

Lee discloses a method as was set forth above with respect to claim 8.

Claim 10 differs from the showing of Lee only in that claim 9 recites that the method is performed by a software driven computer device.

The examiner takes Official Notice that it was notoriously well known in the art to have implemented signal reproduction circuitry, of the type described by Lee, using a software driven computer. Such configurations were known to have been advantageous in that they did not require the use/cost of dedicated circuitry and that they permitted upgrades to be made simply by updating the software.

The examiner maintains that it would have been obvious to have implemented the system shown in Figure 7 of Lee using a software driven computer, as opposed to dedicated circuitry, to obtain the benefit associated therewith.

14. Claim 1 is rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #6,430,361 to Lee in view of US Patent Publication #2003/0113096 to Taira et al.

A) The examiner notes that, with respect to the instant rejection, claim 1 has been more narrowly construed as requiring the recited "flag" to be data that is separate and distinct from the number of angles.

B) As is shown in figure 7, Lee discloses a reproducing apparatus for reproducing content data recorded on a recording medium wherein the apparatus comprises:

1) **Reading means** (e.g., @ 42, 44, 46, 48, 54, 58) for reading content data from the recording medium [note lines 28-32 of column 3] wherein, as shown in figure 9, the content data comprises system information [note lines 13-17 of column 4] that includes:

- 1) "NO. OF ANGLES" data which, as described, serves and a **flag** for representing whether the associated content data reproduction unit can be reproduced with a plurality of angles [Note: lines 61-63 of column 4; and block 101 of Figure 10];
- 2) "NO. OF ANGLES" data which serves to identify the number of angles that the associated content data reproduction unit can reproduce; and

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3) "Start Add. OF VIDEO BLOCK" data which identifies the start of each of the video blocks and thus represent the position of the respective angles; and

2) **Reproducing means** (e.g., @ 62, 64) for controlling the reading means so that the video stream that composes the angles is read according to the position signals.

C) Claim 1 "differs" from the showing of Lee only in that Lee used the same data to detect the availability of different angles, when available, to detect the number of angles.

D) Taira et al evidences that it was known in the art to have utilized separate data to indicate when different angles are available and, when so, the number of different angles that are available; i.e., a flag for indicating whether or not different angles are available (note lines 6-9 of paragraph 0358); and number data for identifying the number of angles that are available (note paragraphs 0363-0367). Given this showing, it would have been obvious to one of ordinary skill in the art to have modified the system disclosed by Lee via the addition of a separate flag bit for indicating whether additional angles are available. The modification would have been advantageous in that it would have simplified the processing needed to detect numbers of angles greater than one as the number of angles increases (i.e., the detection of a single flag bit as opposed to a multi bit digital code.

15. Claims 2 and 3 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #6,430,361 to Lee in view of US Patent Publication #2003/0113096 to Taira et al. for the same reasons that were explained for claim 1 above.
Additionally:

A) With respect to claim 2:

The reproducing means (@ 62) is configured to change the reproduction position of the stream (via switch 54) in accordance with the position so as to allow the current angle to be switched when the flag indicates that there are a plurality of angles [See figure 10].

B) With respect to claim 3:

It is noted that, as shown in figure 6, the video data stream has been encoded/compressed and formatted into encode units (see figure 9) which necessarily represent one or more video frames. As shown in figure 9, each encode unit is preceded by system information relating thereto. As noted above, the system information of each unit includes respective "NO. OF ANGLES" data acting as a *flag* for that encode unit. Thus, the process shown in figure 10 is performed at the beginning of each encode unit (i.e., the first, second, third, etc,...)

16. Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #6,430,361 to Lee in view of US Patent Publication #2003/0113096 to Taira et al.

A) The examiner notes that, with respect to the instant rejection, claim 1 has been more narrowly construed as requiring the recited "flag" to be data that is separate and distinct from the number of angles.

B) As is shown in figure 7, Lee discloses a reproducing apparatus for reproducing content data recorded on a recording medium wherein the apparatus comprises:

1) Reading means (e.g., @ 42, 44, 46, 48, 54, 58) **for reading** content data from the recording medium [note lines 28-32 of column 3] wherein, as shown in figure 9, the content data comprises system information [note lines 13-17 of column 4] that includes:

- 1) "NO. OF ANGLES" data which, as described, serves and a **flag** for representing whether the associated content data reproduction unit can be reproduced with a plurality of angles [Note: lines 61-63 of column 4; and block 101 of Figure 10];
- 2) "NO. OF ANGLES" data which serves to identify the number of angles that the associated content data reproduction unit can reproduce; and
- 3) "Start Add. OF VIDEO BLOCK" data which identifies the start of each of the video blocks and thus represent the position of the respective angles; and

2) Reproducing means (e.g., @ 62, 64) **for controlling** the reading means so that the video stream that composes the angles is read according to the position signals.

C) Claim 8 "differs" from the showing of Lee only in that Lee used the same data to detect the availability of different angles, when available, to detect the number of angles.

D) Taira et al evidences that it was known in the art to have utilized separate data to indicate when different angles are available and, when so, the number of different angles that are available; i.e., a flag for indicating whether or not different angles are available (note lines 6-9 of paragraph 0358); and number data for identifying the number of angles that are available (note paragraphs 0363-0367). Given this showing, it would have been obvious to one of ordinary skill in the art to have modified the system disclosed by Lee via the addition of a separate flag bit for indicating whether additional angles are available. The modification would have been advantageous in that it would have simplified the processing needed to detect numbers of angles greater than one as the number of angles increases (i.e., the detection of a single flag bit as opposed to a multi bit digital code).

17. Claim 11 is rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #6,430,361 to Lee in view of US Patent Publication #2003/0113096 to Taira et al. for the same reasons that were explained for claim 1 above.

18. Claims 12 and 13 is rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #6,430,361 to Lee in view of US Patent Publication #2003/0113096 to Taira et al. for the same reasons that were explained for claim 11 above.
Additionally:

A) With respect to claim 12:

The reproducing means (@ 62) is configured to change the reproduction position of the stream (via switch 54) in accordance with the position so as to allow the current angle to be switched when the flag indicates that there are a plurality of angles [See figure 10].

B) With respect to claim 13:

It is noted that, as shown in figure 6, the video data stream has been encoded/compressed and formatted into encode units (see figure 9) which necessarily represent one or more video frames. As shown in figure 9, each encode unit is preceded by system information relating thereto. As noted above, the system information of each unit includes respective "NO. OF ANGLES" data acting as a **flag** for that encode unit. Thus, the process shown in figure 10 is performed at the beginning of each encode unit (i.e., the first, second, third, etc,...)

19. Claim 38 is rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent #6,430,361 to Lee in view of US Patent Publication #2003/0113096 to Taira et al. for the same reasons that were explained for claim 1 above. Additionally:

It is noted that, as shown in figure 9, the video stream is recorded in the form of respective reproduction units.

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20. Claims 4-7 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

21. Any inquiry concerning this communication or earlier communications from the examiner should be directed to DAVID E. HARVEY whose telephone number is (571) 272-7345. The examiner can normally be reached on M-F from 7 AM to 3:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Miller, can be reached on (571) 272-7353. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/DAVID E HARVEY/

Primary Examiner, Art Unit 2621

DAVID E HARVEY
Primary Examiner
Art Unit 2621